# Patrick De Leenheer

List of Publications by Year
in descending order

Source: https://exaly.com/author-pdf/10388408/publications.pdf

Version: 2024-02-01

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|---|---|---|---|
| 38 papers | 1,502 citations | 394286 19 h-index | 414303 32 g-index |
| 38 all docs | 38 docs citations | 38 times ranked | 1214 citing authors |

| # | Article | IF | Citations |
|---|---|---|---|
| 1 | Virus Dynamics: A Global Analysis. SIAM Journal on Applied Mathematics, 2003, 63, 1313-1327. | 0.8 | 361 |
| 2 | A Petri net approach to the study of persistence in chemical reaction networks. Mathematical Biosciences, 2007, 210, 598-618. | 0.9 | 154 |
| 3 | Feedback control for chemostat models. Journal of Mathematical Biology, 2003, 46, 48-70. | 0.8 | 121 |
| 4 | The abundant marine bacterium Pelagibacter simultaneously catabolizes dimethylsulfoniopropionate to the gases dimethyl sulfide and methanethiol. Nature Microbiology, 2016, 1, 16065. | 5.9 | 110 |
| 5 | Monotone Chemical Reaction Networks. Journal of Mathematical Chemistry, 2007, 41, 295-314. | 0.7 | 97 |
| 6 | Quorum Activation at a Distance: Spatiotemporal Patterns of Gene Regulation from Diffusion of an Autoinducer Signal. Journal of the American Chemical Society, 2012, 134, 5618-5626. | 6.6 | 68 |
| 7 | Graph-theoretic characterizations of monotonicity of chemical networks in reaction coordinates. Journal of Mathematical Biology, 2010, 61, 581-616. | 0.8 | 62 |
| 8 | Persistence Results for Chemical Reaction Networks with Time-Dependent Kinetics and No Global Conservation Laws. SIAM Journal on Applied Mathematics, 2011, 71, 128-146. | 0.8 | 45 |
| 9 | Global analysis of within host virus models with cell-to-cell viral transmission. Discrete and Continuous Dynamical Systems - Series B, 2014, 19, 3341-3357. | 0.5 | 43 |
| 10 | Failure of antibiotic treatment in microbial populations. Journal of Mathematical Biology, 2009, 59, 563-579. | 0.8 | 41 |
| 11 | Chemical networks with inflows and outflows: A positive linear differential inclusions approach. Biotechnology Progress, 2009, 25, 632-642. | 1.3 | 36 |
| 12 | Multistrain virus dynamics with mutations: a global analysis. Mathematical Medicine and Biology, 2008, 25, 285-322. | 0.8 | 33 |
| 13 | Parasite sources and sinks in a patched Rossâ€“Macdonald malaria model with human and mosquito movement: Implications for control. Mathematical Biosciences, 2016, 279, 90-101. | 0.9 | 33 |
| 14 | On Predator-Prey Systems and Small-Gain Theorems. Mathematical Biosciences and Engineering, 2005, 2, 25-42. | 1.0 | 32 |
| 15 | Traveling waves in response to a diffusing quorum sensing signal in spatially-extended bacterial colonies. Journal of Theoretical Biology, 2014, 363, 53-61. | 0.8 | 31 |
| 16 | Crowding effects promote coexistence in the chemostat. Journal of Mathematical Analysis and Applications, 2006, 319, 48-60. | 0.5 | 26 |
| 17 | A Petri Net Approach to Persistence Analysis in Chemical Reaction Networks. Lecture Notes in Control and Information Sciences, 2007, , 181-216. | 0.6 | 23 |
| 18 | Within-Host Virus Models with Periodic Antiviral Therapy. Bulletin of Mathematical Biology, 2009, 71, 189-210. | 0.9 | 21 |

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|---|---|---|---|
| 19 | On the structural monotonicity of chemical reaction networks. , 2006, , . | | 20 |
| 20 | Immune response to a malaria infection: properties of a mathematical model. Journal of Biological Dynamics, 2008, 2, 102-120. | 0.8 | 19 |
| 21 | Global stability in a chemostat with multiple nutrients. Journal of Mathematical Biology, 2006, 52, 419-438. | 0.8 | 16 |
| 22 | Tragedy of the commons in the chemostat. PLoS ONE, 2017, 12, e0186119. | 1.1 | 16 |
| 23 | The puzzle of partial migration: Adaptive dynamics and evolutionary game theory perspectives. Journal of Theoretical Biology, 2017, 412, 172-185. | 0.8 | 14 |
| 24 | Global analysis of a predatorâ€“prey model with variable predator search rate. Journal of Mathematical Biology, 2020, 81, 159-183. | 0.8 | 12 |
| 25 | The effectiveness of marine protected areas for predator and prey with varying mobility. Theoretical Population Biology, 2016, 110, 63-77. | 0.5 | 11 |
| 26 | Division of labor in bacterial populations. Mathematical Biosciences, 2019, 316, 108257. | 0.9 | 11 |
| 27 | Senescence and antibiotic resistance in an age-structured population model. Journal of Mathematical Biology, 2010, 61, 475-499. | 0.8 | 8 |
| 28 | Stabilizing a Periodic Solution in the Chemostat: A Case Study in Tracking. , 2006, , . | | 7 |
| 29 | The chemostat with lateral gene transfer. Journal of Biological Dynamics, 2010, 4, 607-620. | 0.8 | 7 |
| 30 | Feedback-Mediated Oscillatory Coexistence in the Chemostat. Lecture Notes in Control and Information Sciences, 2006, , 97-104. | 0.6 | 6 |
| 31 | Strong cooperation or tragedy of the commons in the chemostat. Mathematical Biosciences and Engineering, 2019, 16, 139-149. | 1.0 | 4 |
| 32 | Global stability for monotone tridiagonal systems with negative feedback. , 2008, , . | | 3 |
| 33 | Optimal Placement of Marine Protected Areas: a Trade-off Between Fisheries Goals and Conservation Efforts. IEEE Transactions on Automatic Control, 2014, 59, 1583-1587. | 3.6 | 3 |
| 34 | Population models with partial migration. Journal of Difference Equations and Applications, 2016, 22, 316-329. | 0.7 | 3 |
| 35 | Dispersal kernels may be scalable: Implications from a plant pathogen. Journal of Biogeography, 2019, 46, 2042-2055. | 1.4 | 3 |
| 36 | On persistence of chemical reaction networks with time-dependent kinetics and no global conservation laws. , 2009, , . | | 1 |

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|---|---|---|---|
| 37 | The ideal free distribution and the evolution of partial migration. Journal of Difference Equations and Applications, 2021, 27, 462-477. | 0.7 | 1 |
| 38 | Output Diffusion of the Monopolist Over Time and Space. Journal of Optimization Theory and Applications, 2016, 169, 290-298. | 0.8 | 0 |